Amendments To Claims

1. (Currently Amended) A differential amplifier, comprising:

a pair of transistors;

~~first transformer that is arranged to provide~~ a pair of mutually coupled inductors ~~for~~ that are arranged to bias the transistors.

2. (Currently Amended) The differential amplifier of claim 1, wherein the mutually coupled inductors comprise a transformer ~~are arranged to bias the transistors~~.

3. (Original) The differential amplifier of claim 1, wherein the mutually coupled inductors are arranged to provide output impedance matching for the differential amplifier.

4. (Original) The differential amplifier of claim 1, wherein the mutually coupled inductors are arranged to provide input impedance matching for the differential amplifier.

5. (Original) The differential amplifier of claim 1, wherein the mutually coupled inductors are arranged to provide noise control for the differential amplifier.

6. (Original) The differential amplifier of claim 1, wherein the mutually coupled inductors are arranged to increase common mode rejection in the differential amplifier.

7. (Currently Amended) The differential amplifier of claim 1, wherein the ~~first transformer is~~ the mutually

coupled inductors are coupled in series with a source of each transistor.

8. (Currently Amended) The differential amplifier of claim 1, wherein the ~~first transformer is~~ the mutually coupled inductors are coupled in series with a first terminal of each transistor.

9. (Currently Amended) The differential amplifier of claim 8, further comprising ~~a second transformer that is~~ a second pair of mutually coupled inductors that are coupled in series with a second terminal of each transistor.

10. (Currently Amended) The differential amplifier of claim 9, wherein the mutually coupled inductors ~~of the first transformer~~ are arranged to bias the transistors and to provide output impedance matching and wherein the second pair of mutually coupled inductors ~~of the second transformer~~ are arranged to bias the transistors and to provide input impedance matching and noise control.

11. (Currently Amended) A method for providing a differential amplifier, comprising ~~the step of~~ coupling a pair of mutually coupled inductors ~~of a first transformer~~ to bias a pair of transistors of the differential amplifier.

12. (Currently Amended) The method of claim 11, wherein ~~the step of~~ coupling a pair of mutually coupled inductors comprises ~~the step of~~ coupling a transformer to the transistors ~~arranging the mutually coupled inductors to bias the transistors~~.

13. (Currently Amended) The method of claim 11, wherein ~~the step of~~ coupling a pair of mutually coupled inductors comprises ~~the step of~~ arranging the mutually coupled inductors to provide output impedance matching for the differential amplifier.

14. (Currently Amended) The method of claim 11, wherein ~~the step of~~ coupling a pair of mutually coupled inductors comprises ~~the step of~~ arranging the mutually coupled inductors to provide input impedance matching for the differential amplifier.

15. (Currently Amended) The method of claim 11, wherein ~~the step of~~ coupling a pair of mutually coupled inductors comprises ~~the step of~~ arranging the mutually coupled inductors to provide noise control for the differential amplifier.

16. (Currently Amended) The method of claim 11, wherein ~~the step of~~ coupling a pair of mutually coupled inductors comprises ~~the step of~~ arranging the mutually coupled inductors to increase common mode rejection in the differential amplifier.

17. (Currently Amended) The method of claim 11, wherein ~~the step of~~ coupling a pair of mutually coupled inductors comprises ~~the step of~~ coupling the mutually coupled inductors ~~the first transformer~~ in series with a source of each transistor.

18. (Currently Amended) The method of claim 11, wherein ~~the step of~~ coupling a pair of mutually coupled inductors comprises ~~the step of~~ coupling the mutually coupled

inductors ~~the first transformer~~ in series with a first terminal of each transistor.

19. (Currently Amended) The method of claim 18, further comprising ~~the step of~~ coupling a second pair of mutually coupled inductors ~~transformer~~ in series with a second terminal of each transistor.

20. (Currently Amended) The differential amplifier of claim 19, wherein the mutually coupled inductors ~~of the first transformer~~ are arranged to bias the transistors and to provide output impedance matching and wherein the second pair of mutually coupled inductors ~~of the second transformer~~ are arranged to bias the transistors and to provide input impedance matching and noise control.